

## IN THE CLAIMS

Please amend the claims as follows:

1. (currently amended) A transmitting device for transmitting a digital information signal via a transmission medium, including:
  - input means for receiving the digital information signal,
  - adaptive prediction filter means adapted to derive a prediction signal from the digital information signal in dependence on an array of prediction filter coefficients,
  - first signal combination means for combining the digital information signal and said prediction signal so as to obtain a residual signal,
  - encoding means for encoding said residual signal so as to obtain an encoded signal,
  - coefficient generator means for generating an array of filter coefficients  $A[i]$  in response to the digital information signal,  $i$  being an integer for which it holds that  $0 \leq i < p$ , where  $p$  is a variable,
  - output means for supplying the encoded signal to an output terminal for transmission via ~~a~~ the transmission medium, and
  - smoothing means for smoothing the array of filter coefficients  $A[i]$  so as to obtain the array of prediction filter coefficients for supply to the adaptive prediction filter means.
2. (previously presented) The transmitting device of claim 1, characterized in that the smoothing means includes low-pass filtering means for low-pass filtering the array of filter coefficients so as to obtain the prediction filter coefficients .
3. (currently amended) The transmitting device of claim 2, characterized in that the low-pass filtering means ~~are in the form of a~~ comprise an FIR filter.

4. (currently amended) The transmitting device of claim 2, characterized in that the low-pass filtering means ~~are in the form of~~ comprise an IIR filter.

5. (previously presented) The transmitting device of claim 2, characterized in that the low pass filtering means is adapted to perform the following equations to obtain the coefficients:

$$C_{out}[0] = C_{in}[0],$$

$C_{out}[i] = 0.25 * C_{in}[i+1] + 0.5 * C_{in}[i] + 0.25 * C_{out}[i-1]$ , whereby  $i$  is an integer and  $1 \leq i \leq n-2$ ,

$$C_{out}[n-1] = C_{in}[n-1],$$

$C_{in}[x]$  being coefficient number  $x$  before smoothing, and  $C_{out}[x]$  being coefficient number  $x$  after smoothing.

6. (currently amended) The transmitting device of any one of the preceding claims, ~~in the form of~~ comprises an arrangement for writing the encoded signal on a record carrier.

7. (currently amended) The method of transmitting a digital information signal via a transmission medium, comprising:

- receiving the digital information signal,
- deriving a prediction signal from the digital information signal in dependence on an array of prediction filter coefficients,
- combining the digital information signal and said prediction signal so as to obtain a residual signal,
- encoding said residual signal so as to obtain an encoded signal,
- generating an array of filter coefficients  $A[i]$  in response to the digital information signal,  $i$  being an integer for which it holds that  $0 \leq i < p$ , where  $p$  is a variable,

- supplying the encoded signal to an output terminal for transmission via a the transmission medium, and
- smoothing the array of filter coefficients  $A[i]$  so as to obtain the array of prediction filter coefficients.

8. (canceled)

9. (currently amended) The method of claim 7 wherein:

the smoothing includes low-pass filtering the array of filter coefficients  $A[i]$  so as to obtain the prediction filter coefficients;

the low-pass filtering is selected between one or more of: FIR filtering and IIR filtering;

the low pass filtering applies the following equations to obtain the prediction filter coefficients:  $C_{out}[0] = C_{in}[0]$ ;  $C_{out}[i] = 0.25 \cdot C_{in}[i+1] + 0.5 \cdot C_{in}[i] + 0.25 \cdot C_{out}[i-1]$ , whereby  $i$  is an integer and  ~~$1 \leq i \leq n-2$~~   $1 \leq i \leq n-2$ ;  $C_{out}[n-1] = C_{in}[n-1]$ ,  $C_{in}[x]$  being coefficient number  $x$  before smoothing., and  $C_{out}[x]$  being coefficient number  $x$  after smoothing;

supplying the encoded signal includes writing the encoded signal on a record carrier.

10. (previously presented) The receiver of claim 8, wherein:

the smoothing means includes low-pass filtering means for low-pass filtering the array of filter coefficients so as to obtain the prediction filter coefficients;

the low-pass filtering means are selected from one or more of: a FIR filter and an IIR filter;

the low pass filtering means is adapted to apply the following equations to obtain the prediction filter coefficients:  $C_{out}[0] = C_{in}[0]$ ;  $C_{out}[i] = 0.25 \cdot C_{in}[i+1] + 0.5 \cdot C_{in}[i] + 0.25 \cdot C_{out}[i-1]$ , whereby  $i$  is an integer and  $1 \leq i \leq n-2$ ;  $C_{out}[n-1] = C_{in}[n-1]$ ,  $C_{in}[x]$  being

coefficient number  $x$  before smoothing, and  $C_{out}[x]$  being coefficient number  $x$  after smoothing; and

the output means includes an arrangement for writing the encoded signal on a record carrier.